IN THE CLAIMS:

Please amend the claims as follows:

4. (amended) A method of regulating the signal transduction pathway mediated by binding of an imidazoleacetic acid-ribotide to an imidazoline receptor comprising the step of contacting said receptor expressed in a cell with the imidazoleacetic acid-ribotide.

5. (amended) A method of regulating the signal transduction pathway mediated by binding of an imidazoleacetic acid-riboside to an imidazoline receptor comprising the step of contacting said receptor expressed in a cell with imidazoleacetic acid-riboside.

6. (amended) A method of regulating the signal transduction pathway mediated by binding of an imidazoleacetic acid-ribotide congener or imidazoleacetic acid-riboside congener to an imidazoline receptor comprising the step of contacting said imidazoline receptor with said congener.

Please add the following claims:

--17. (New) The method of claim 4 wherein the methylene group is substituted for the oxygen atom that links the 5' carbon to the phosphate atom in the imidazoleacetic acid-ribotide.

18. (New) The method of claim 4 wherein the imidazoleacetic acid-ribotide is a 2' or 3' deoxy-IAA-RP.

19. (New) The method of claim 4 wherein the imidazoleacetic acid-ribotide is a carboxy-methyl or carboxy-ethyl ester of IAA-RP.

20. (New) The method of claim 4, 5, or 6 wherein furan is linked to the number 2 carbon atom of the imadazole ring.

21. (New) The method of claim 4, 5, or 6 wherein furan is linked to the nitrogen closest to the methylene-carboxy side chain of the imidazole ring.

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22. (New) The method of claim 4, 5 or 6, wherein the imadazole ring is converted to an imadzoline ring.

23. (New) The method of claim 4, 5 or 6 wherein the signal transduction pathway is activated.

24. (New) The method of claim 4, 5 or 6 wherein the signal transduction pathway is repressed.

25. (New) The method of claim 22 wherein activation of the signal transduction pathway results in release of arachidonic acid.